WE CLAIM:

1. A method of treating a disease state characterized by alterations to the mucin levels in a patient, the method comprising enterally administering to the patient a nutritional composition which has a protein source including amino acids wherein threonine comprises at least 5.5% by weight of the amino acids.

2. The method of claim 1 wherein threonine comprises at least 6% by weight of the amino acids.

3. The method of claim 1 wherein the protein source comprises sweet whey protein.

4. The method of claim 3 wherein the sweet whey protein is hydrolyzed.

5. The method of claim 1 wherein the nutritional composition further comprises a lipid source and a carbohydrate source.

6. The method of claim 5 wherein the lipid source comprises a mixture of medium chain triglycerides and long chain triglycerides.

7. The method of claim 6 wherein the lipid source comprises about 30% to about 80% by weight of medium chain triglycerides.

8. A method for maintaining the synthesis of mucins in a patient, the method comprising enterally administering to the patient a nutritional composition which has a protein source including amino acids wherein threonine comprises at least 5.5% by weight of the amino acids.

9. The method of claim 8 wherein the protein source comprises sweet whey protein.

10. The method of claim 9 wherein the sweet whey protein is hydrolyzed.

11. The method of claim 8 wherein the nutritional composition further comprises a lipid source and a carbohydrate source.

12. The method of claim 11 wherein the lipid source comprises a mixture of medium chain triglycerides and long chain triglycerides.

13. The method of claim 12 wherein the lipid source comprises about 30% to about 80% by weight of medium chain triglycerides.

14. A method for maintaining the synthesis of mucins in a patient, the method comprising enterally administering to the patient a nutritional composition which includes a protein source containing a therapeutically effective amount of threonine, a carbohydrate source and a lipid source including a mixture of medium chain triglycerides and long chain triglycerides.

15. The method of claim 14 wherein the amount of threonine comprises at least 5.5% by weight of amino acids of the protein source.

16. The method of claim 14 wherein the protein source comprises sweet whey protein.

17. The method of claim 14 wherein the sweet whey protein is hydrolyzed.

18. The method of claim 14 wherein the lipid source comprises about 30% to about 80% by weight of medium chain triglycerides.

19. The method of claim 14 wherein the protein source provides about 10% to about 20% of the energy of the nutritional composition.

20. A method of treating a disease state characterized by alterations to the mucin levels in a patient, the method comprising enterally administering to the patient a nutritional composition that has a protein source including amino acids wherein threonine comprises at least 7.4% by weight of the amino acids.

21. The method of claim 20 wherein threonine comprises at least 14% by weight of the amino acids.

22. The method of claim 20 wherein the protein source comprises a sweet whey protein.

23. The method of claim 20 wherein the protein source comprises a caseino-glyco-macropeptide.

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24. A method for maintaining the synthesis of mucins in a patient, the method comprising enterally administering to the patient a nutritional composition which has a protein source including amino acids wherein threonine comprises at least 7.4% by weight of the acids.

25. The method of claim 24 wherein threonine comprises at least 14% by weight of the amino acids.

26. The method of claim 24 wherein the protein source comprises a sweet whey protein.

27. The method of claim 24 wherein the protein source comprises caseino-glyco-macropeptide.

28. A method for increasing the synthesis of mucins, the method comprising supplementing a diet of a patient by adding a therapeutically effective amount of threonine to the diet.

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29. The method of claim 28 wherein the amount of threonine is at least 0.2mM.

30. The method of claim 28 wherein the amount of threonine is at least 0.8mM.

31. The method of claim 22 wherein the amount of threonine ranges from about 0.2mM to about 0.8mM.

32. A method for increasing the synthesis of mucins in a patient, the method comprising administering to the patient a nutritional composition which has a protein source containing theronine at least 30% of a daily recommended amount of threonine.

33. The method of claim 32 wherein the amount of threonine comprises at least 60% of the daily recommended amount of threonine.

34. The method of claim 32 wherein the amount of threonine comprises at least 100% of the daily recommended amount of threonine.

35. A method of treating intestinal inflammation in a patient, the method comprising administering to the patient a therapeutically effective amount of threonine.

36. The method of claim 35 wherein the threonine is provided as a nutritional supplement.

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37. The method of claim 36 wherein the nutritional supplement contains threonine in an amount of at least 0.2mM.

38. The method of claim 36 wherein the nutritional supplement contains a protein source including amino acids and wherein the threonine is at least 5.5% by weight of amino acids.

39. The method of claim 36 wherein the nutritional supplement contains a sweet whey protein.

40. A method of treating intestinal bacterial infection in a patient, the method comprising administering a nutritional composition to the patient wherein the nutritional composition contains a therapeutically effective amount of threonine.

41. The method of claim 40 wherein the threonine is provided as a nutritional supplement.

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42. The method of claim 41 wherein the nutritional supplement contains threonine in an amount of at least 0.2mM.

43. The method of claim 41 wherein the nutritional supplement contains a protein source including amino acids and wherein the threonine is at least 5.5% by weight of amino acids.

44. The method of claim 41 wherein the nutritional supplement contains a sweet whey protein.

45. A method of reducing oxidative stress due to acute intestinal inflammation, the method comprising administering a therapeutically effective amount of threonine.

46. The method of claim 45 wherein the threonine is part of a nutritional composition.

47. The method of claim 46 wherein the nutritional composition contains threonine in an amount of at least 0.2mM.

48. The method of claim 46 wherein the nutritional composition contains a protein source including amino acids and wherein the threonine is at least 5.5% by weight of amino acids.

49. The method of claim 48 wherein the nutritional composition contains a sweet whey protein.